

**THIS OPINION WAS NOT WRITTEN FOR PUBLICATION**

The opinion in support of the decision being entered today (1) was not written for publication in a law journal and (2) is not binding precedent of the Board.

Paper No. 15

UNITED STATES PATENT AND TRADEMARK OFFICE

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BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES

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*Ex parte* JEFFREY W. MORSE

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Appeal No. 96-4107  
Application No. 08/368,262<sup>1</sup>

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ON BRIEF

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Before MEISTER, ABRAMS and NASE, *Administrative Patent Judges*.

ABRAMS, *Administrative Patent Judge*.

**DECISION ON APPEAL**

This is an appeal from the decision of the examiner finally rejecting claims 1 through 9, even after an amendment was entered after the final rejection. These are all of the claims of record in the application.

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<sup>1</sup>Application for patent filed December 27, 1994.

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The appellant's invention is directed to a connector for use in wound and lavage irrigation. The subject matter before us on appeal is illustrated by reference to claims 1 and 3, which read as follows:

1. A connector for use in wound and lavage irrigation, comprising a spiked end shaped to mate with a self-sealing outlet for a compressible bag of sterile irrigation fluid and a nozzle end having the size and shape of a syringe tip such that it can friction fit inside a hub of an IV catheter.

3. A connector for use in wound and lavage irrigation, comprising a spiked end shaped to mate with a self-sealing outlet for a compressible bag of sterile irrigation fluid and a nozzle end having the size and shape of a syringe tip such that it can friction fit inside a hub of an IV catheter, the nozzle end including a plurality of annular ridges for securing a tube onto the nozzle end.

#### **THE REFERENCES**

The references relied upon by the examiner to support the final rejection are:

Thomas et al. (Thomas) 1957	2,777,443	Jan. 15,
Harrison 1964	3,119,391	Jan. 28,
Barrington 1976	3,986,508	Oct. 19,
Harvey et al. (Harvey) 1989	4,816,221	Mar. 28,

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Sozuki et al. (Sozuki) 1993	5,273,523	Dec. 28,
Plechinger et al. 1994 (Plechinger)	5,318,518	Jun. 7,
Adolf et al. (Adolf) 1994	5,334,180	Aug. 2,

#### **THE REJECTIONS**

Claim 1 stands rejected under 35 U.S.C. § 102(b) as being anticipated by Harvey, Harrison or Adolf.

Claims 2 and 3 stand rejected under 35 U.S.C. § 102(b) as being anticipated by Barrington or Thomas.

Claims 4 and 5 stand rejected under 35 U.S.C. § 103 as being unpatentable over Harvey in view of Harrison.

Claims 6 and 9 stand rejected under 35 U.S.C. § 103 as being unpatentable over Harvey in view of Harrison and Sozuki.

Claims 7 and 8 stand rejected under 35 U.S.C. § 103 as being unpatentable over Harvey in view of Harrison and Plechinger.

The rejections are explained in the Examiner's Answer.

The opposing viewpoints of the appellant are set forth in the Brief and the Reply Brief.

### OPINION

Before evaluating the patentability of the claims in view of the prior art applied against them, it is necessary for us to interpret some of the terminology utilized in the claims.

The first of these issues concerns the meaning to be applied to the term "connector," as used in the claims. The appellant's invention is directed to a "connector" for use in irrigating a wound or in lavage irrigation. In use, the connector is attached on the one hand to a bag of IV fluid and on the other hand to either an IV catheter or a nasogastric tube. In the paragraph bridging pages 8 and 9 of the specification, the appellant explains his invention as follows, with emphasis added:

Connector 10 includes a spiked end 12 shaped to fit into and mate with the self-sealing outlet of a conventional IV bag and a nozzle end 14 shaped the same as a conventional IV syringe, so that a conventional IV needle or IV catheter will friction fit onto nozzle end 14 the same as on a IV syringe. Nozzle end 14 also includes annular ridges 16 for better securing of nasogastric tubing that might be attached to nozzle 14.

Common to all of the claims is the requirement that the connector have a spiked end to mate with the outlet of a compressible bag of sterile solution and a nozzle end of such size and shape as to friction fit inside the hub of an IV catheter. It immediately strikes us that if "connector" is given its broadest interpretation, that is, any device that connects one object to another, all of the subject matter of some of the claims, and significant portions of others, reads on a conventional IV tubing set, which has on one end the required spike and on the other end the required nozzle. However, it is clear from the appellant's disclosure that this is not what is intended; the appellant actually intends that "connector" have a much more limited scope, which does not read on conventional IV tubing sets. This conclusion is supported in the specification. Early on, appellant acknowledges that conventional IV tubing sets and catheters have been used with compressible bags of fluids to irrigate wounds. He then explains that this arrangement suffered from several disadvantages, including not allowing the user to easily provide sufficient force to the stream of irrigation

fluid issuing from the catheter to properly irrigate a wound, owing to the resistance to flow caused by the length of the IV tubing and the relative narrowness of its opening even when the IV bag was squeezed, and requiring considerable equipment (pages 3 and 4). Then comes the explanation of the invention, which solves these problems by eliminating the IV tubing in favor of a compact device of injection-molded plastic having a length of only about 6.8 cm, which is very short when compared to the conventional IV tubing.

For the above reasons, we shall interpret the term "connector" in the appellant's claims as being limited in scope to a device of such short length as to permit fluid flowing therethrough to be pressurized to a pressure sufficient to adequately irrigate a wound, such as the 7-8 psig recited in the appellant's specification (page 4). In view of the nature of the prior art devices cited by the examiner against the claims, it would appear that he also interpreted "connector" in this limited fashion, although such is not explicitly stated on the record.

The second matter here concerns the size and shape of the nozzle of the connector. The specification states that the

appellant's invention is intended to be used with "conventional" compressible IV bags and "conventional" IV catheters (page 9, line 25 *et seq.*). See also page 1, line 20 *et seq.* and page 3, line 17 *et seq.*. This being the case, we shall interpret the phrase "size and shape of a syringe tip such that it can friction fit inside the hub of an IV catheter" as relating to the conventional, or standard, IV catheter utilized in the field, which has a hub of dimensions known to one of ordinary skill in the art (the "luer" hub), of the existence of which we take official notice. The examiner did not so limit the meaning of this phraseology.

*The Rejections Under 35 U.S.C. § 102(b)*

We have evaluated these rejections on the basis that anticipation is established only when a single prior art reference discloses, either expressly or under principles of inherency, each and every element of the claimed invention. See *In re Paulsen*, 30 F.3d 1475, 1480-81, 31 USPQ2d 1671, 1675 (Fed. Cir. 1994).

Independent claim 1 stands rejected as being anticipated by Harvey, Harrison, or Adolf. This claim requires a

"connector" having a spiked end shaped to mate with the outlet of a compressible bag of sterile fluid and a nozzle end "having the size and shape of a syringe tip such that it can friction fit inside the hub of an IV catheter." All three of the applied references disclose a connector having a spiked end that meets the requirements of the claim. However, none explicitly teach that the other end of the connector is of such size and shape as to friction fit inside the hub of a conventional IV syringe. Nor, in our view, is there any indication that such inherently would be the case. Harvey merely describes the other end of the connector as fitting into a conduit (column 3, lines 55 through 57). Harrison describes it only as "a connecting section" (column 1, line 54). In the Adolph device, the connectors (unnumbered in Figures 9 and 10) are not described.

The examiner admits that while none of the references discloses specific size limitations, the limitations in question merely concern the size of the invention, which does not distinguish it from those of the applied prior art (Answer, page 5). We do not agree. We view the size and shape requirements recited in the claims to be structural



limitations which should be interpreted in the manner explained immediately above, and which must be considered in evaluating the patentability of the claims. See, e.g., *In re Venezia*, 530 F.2d 956, 957, 189 USPQ 149, 151-152 (CCPA 1976). It therefore is our conclusion that none of the three references applied discloses structure which anticipates the subject matter of claim 1, for none show or describe a connector having a nozzle with the required size and shape. This being the case, we will not sustain this rejection.

Claims 2 and 3 stand rejected as being unpatentable over Barrington or Thomas. Claim 2 adds to claim 1 a plurality of annular ridges on the nozzle end of the connector for securing a tube thereon, and claim 3 is an independent claim which requires that the nozzle end have both the friction fit configuration and the ridges. Barrington discloses a connector (14) which has a piercing spike (44) on one end. At the other end is a nozzle with ridges so that it can be attached to tubing. However, as was the case in the references cited against claim 1, there is no disclosure or teaching that the other end of the connector is of the size

and shape of a syringe tip such that it can friction fit inside the hub of an IV catheter, as is required in both of these claims, nor does such appear to be inherent. The Thomas reference suffers from the same shortcoming.

Therefore, neither reference anticipates these two claims and this rejection is not sustained.

*The Rejections Under 35 U.S.C. § 103*

The test for obviousness is what the combined teachings of the prior art would have suggested to one of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 425, 208 USPQ 871, 881 (CCPA 1981). However, the mere fact that the prior art structure could be modified does not make such a modification obvious unless the prior art suggests the desirability of doing so. See *In re Gordon*, 733 F.2d 900, 902, 221 USPQ 1125, 1127 (Fed. Cir. 1984). The initial burden of establishing a basis for denying patentability to a claimed invention rests with the examiner. See *In re Piasecki*, 745 F.2d 1468, 223 USPQ 785 (Fed. Cir. 1984).

Independent claim 4 and dependent claim 5 have been rejected as being unpatentable over Harvey in view of

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Harrison. Claim 4 is directed to an apparatus comprising a compressible bag of fluid having a self-sealing outlet and a connector having a spiked end for mating with the bag and a nozzle end sized and shaped like a syringe tip such that it can friction fit inside the hub of an IV catheter. Claim 5 adds an IV catheter attached to the nozzle end.

We have discussed both of these references above. As we there stated, neither discloses a connector with a nozzle end that meets the limitations of the claim. Nor, in our view, would the teachings of the two references, considered together, have provided suggestion to one of ordinary skill in the art to so modify the Harvey connector. Such would appear to reside only in the hindsight accorded one who first viewed the appellant's disclosure. This, of course, is an impermissible basis for a rejection. See *In re Fritch*, 972 F.2d 1260, 1266, 23 USPQ2d 1780, 1784 (Fed. Cir. 1992). The rejection of claims 4 and 5 is not sustained.

Claims 6 and 9 stand rejected as being unpatentable over Harvey and Harrison, taken further in view of Sozuki, cited for its teaching of attaching a nasogastric tube to a connector that also has another use. Both of these

independent claims also require the particular nozzle end configuration that has been discussed above, which includes both the capability of friction fit to the inside of the hub of an IV catheter and the annular ridges for receiving a nasogastric tube. The teachings of Sozuki do not overcome the deficiencies regarding the IV catheter attachment which we have pointed out above with regard to Harvey and Harrison. Nor, in our view, would Sozuki have suggested to one of ordinary skill in the art that the nozzle end of the connector be provided with the capability of attachment to either an IV catheter or a nasogastric tube. The rejection therefore is not sustained.

Finally, claims 7 and 8 are rejected as being unpatentable over Harvey and Harrison, further in view of Plechinger. While Plechinger teaches using a catheter for irrigation, it is not a conventional IV catheter, but a specialized two lumen device (column 3, lines 4 and 5). The added reference does not cure the problems with the other two, which have been discussed above. That being the case, this rejection is not sustained.

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**SUMMARY**

None of the rejections are sustained.

The decision of the examiner is reversed.

**REVERSED**

	JAMES M. MEISTER	)	
	Administrative Patent Judge)	)	
		)	
		)	
	NEAL E. ABRAMS	)	BOARD OF
PATENT	Administrative Patent Judge)	)	APPEALS AND
		)	INTERFERENCES
		)	
	JEFFREY V. NASE	)	
	Administrative Patent Judge)	)	

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